

Remarks

Claims 1, 3, 6, 7, 9, 11 and 20 remain in the application.

It is noted that the prior rejection of the claims under 35 USC 102(b) as being anticipated by the Chundury, et al., reference has not been maintained.

Claim 1 has been amended to specify the wt.% ethylene and MWD of the propylene-ethylene impact copolymer. These limitations were previously recited in Claim 5 which is now cancelled. In view of the cancellation of Claim 5, the dependency of Claim 6 has been amended.

Claim 3 has been amended to make it clear that the tacticity index and melt flow rate referred to therein relate to the polypropylene base resin.

For the reasons previously stated in their last response, Applicants take exception to the rejection under 35 USC 112, second paragraph, to use of the term "graft to melt flow ratio." It is not seen how the Examiner can continue to maintain the position that the term is not art recognized when the term and basis for its derivation is fully described in the prior art (see U.S. Patent No. 6,716,928 Column 5, lines 13-51). The ratio is a means of defining graft functionalized polymers having a desirable and beneficial balance of high graft monomer content and low melt flow rate.

As to the Examiners' position that "graft" is not a number and therefore cannot be part of a ratio, Applicants submit it is clear from the description and formula provided in the specification at page 12, lines 1-16, that the term "graft" is simply a shorthand notation and stands for the "weight percent monomer grafted." It is, in fact, a number which can be used to generate a ratio. While it is Applicants' belief the term "graft to melt flow ratio" is clear in view of the specification, they nevertheless have amended

Claim 6 so that it now recites the formula by which the "graft to melt flow rate ratio" is determined. Clearly now there can be no confusion on this point.

Applicants stand by their earlier position that ratios are proportions expressing the relationship between two or more "things" and, as such have no units. While the "things" may themselves have units, which can be the same or different, the ratio does not. It is simply a number indicating the relation of the items being compared to each other. If the Examiner persists in maintaining his position on this matter, he is requested to provide some support that units are required for ratios.

It is Applicants' continued belief that their claimed invention would not be obvious from the combined teachings of Chundury, et al., and Ross, et al. Chundury, et al., at Column 11, lines 35-43, indicate their grafted polyolefins should have molecular weights less than that of the major polyolefin component. They even state that, in one embodiment, the molecular weight of the polyolefin which is grafted is only 2000 to 10000. These are wax-type materials or elastomers having high ethylene contents (43 to 77%) as pointed out in the paragraph bridging Columns 11 and 12.

Absent a clear teaching in Chundury, et al., or by Ross, et al., to the use of grafted impact copolymers, the skilled artisan would not be moved to consider the use of such products for PP/incompatible polymer blends and particularly use of copolymers having ethylene contents from 5 to 30% as are now called for by Applicants' claims. This is particularly so in view of the poor results achieved with Control D in Table IV of the Chundury, et al., reference. Based on the results reported for Control D the skilled artisan could only conclude that compositions containing PP, nylon and ethylene-propylene polymers of any type having ethylene contents of 45% or below will have unsatisfactory performance.

Furthermore, the results obtained with Control D would lead the skilled artisan to the inevitable conclusion that even if other maleated products were considered for use,

they would be ineffective unless used in combination with a terpolymers compatibilizing agent.

And there is nothing in the Ross, et al., reference that would cause the skilled artisan to conclude any differently. Ross, et al., do not even deal with maleated products but only a process for making unmodified homopolymers, random and impact copolymers.

In view of the foregoing and since it is Applicants' belief all of the claims are in condition for allowance, entry of this amendment and favorable action are requested. In the alternative, entry of the amendment is requested since it places the claims in better form for consideration on appeal.

Should the Examiner wish to discuss the foregoing or any matter of form in an effort to advance the application toward allowance, he is urged to telephone the undersigned at the indicated number.

Respectfully submitted,


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